STATE OF DELAWARE
EXECUTIVE DEPARTMENT
OFFICE OF MANAGEMENT AND BUDGET
STATE PLANNING COORDINATION

January 25, 2006

Zachary Crouch
Davis, Bowen & Friedel, Inc.
23 North Walnut Street
Milford, DE 19963

RE: PLUS review – PLUS 2005-12-06; Diakos and Pappas Subdivision

Dear Mr. Crouch:

Thank you for meeting with State agency planners on January 4, 2006 to discuss the proposed plans for the Diakos and Pappas subdivision project to be located at 281 Main Street in Cheswold.

According to the information received, you are seeking site plan approval for 86 single family townhomes on 14.3 acres.

Please note that changes to the plan, other than those suggested in this letter, could result in additional comments from the State. Additionally, these comments reflect only issues that are the responsibility of the agencies represented at the meeting. The developers will also need to comply with any Federal, State and local regulations regarding this property. We also note that as the Town of Cheswold is the governing authority over this land, the developers will need to comply with any and all regulations/restrictions set forth by the Town.

Executive Summary

The following section includes some site specific highlights from the agency comments found in this letter. This summary is provided for your convenience and reference. The full text of this letter represents the official state response to this project. ***Our office***

notes that the applicants are responsible for reading and responding to this letter and all comments contained within it in their entirety.

State Strategies/Project Location

- This project is located in Investment Levels 1 and 2 according to the *Strategies for State Policies and Spending.* This site is also located in the Town of Cheswold. Investment Level 1 reflects areas that are already developed in an urban or suburban fashion, where infrastructure is existing or readily available, and where future redevelopment or infill projects are expected and encouraged by State policy. Investment Level 2 reflects areas where growth is anticipated by local, county, and State plans in the near term future. Our office has no objections to the proposed development of this project in accordance with the relevant Town codes and ordinances. We strongly encourage the applicants to address the environmental comments and recommendations found in this letter due to the sensitive natural features present on and adjacent to this site.

Street Design and Transportation

- Route 42, including Cheswold's Main Street, is classified as a major collector road. DelDOT's policy is to require dedication of sufficient land to provide a minimum right-of-way width of 40 feet from the centerline on collector roads. Therefore they will require right-of-way dedication along the frontage to provide any additional width needed from this project.

- Because the entrance of the adjoining manufactured housing community, shown on the site plan as lands of Archie D. Blanton, is undesirably close to the railroad tracks, DelDOT recommends that a stub street be provided so that the Blanton land can be served through the proposed entrance if it is ever redeveloped.

- A second stub street to the Blanton land, while less important, would also be desirable in that it would allow for improved circulation between the two developments.

- DelDOT recommends that the sidewalk, already present along Main Street, be extended into the site and along both sides of the development streets.

- In addition to the sidewalk, a 15-foot wide permanent easement for a future multi-use path, should be provided along the site frontage on Main Street. DelDOT asks that the developer's engineer contact Mr. Herb to discuss this matter further. Mr. Herb may be reached at (302) 266-9600.

- DelDOT recommends that the proposed triangular island be eliminated in favor of a standard tee intersection.

Natural and Cultural Resources

- The project will be demolishing all standing structures on the property. Cheswold is the location of recent architectural documentation survey work from students from the University of Delaware through this office. The DHCA requests to be able to gain access the property and complete survey documentation on the property

- PLUS materials indicate the presence of palustrine forested wetlands along the northern and most of the eastern boundaries of subject parcel. These wetlands provide water quality benefits, attenuate flooding and provide important habitat for plants and wildlife. Vegetated buffers of no less than 100 feet should be employed from the edge of the wetland complex. Site plans clearly show direct impacts to wetlands through construction activities.

- This project is located directly adjacent to headwater wetlands associated with the Alston Branch of the greater Leipsic River. In recognition of the impacts to water and habitat quality and the necessity to protect it for long-term sustainable use, the Watershed Assessment Section strongly urges the applicant to consider preserving as much of the existing naturally-forested buffer as possible. The buffer should be no less than 100-feet from wetlands and water bodies.

- The Drainage Program requests the wetland buffers on this project be open space. Relocate townhouses that adjoin wetlands to avoid the wetland buffer from being the backyards.

- According to the application, 9.4 acres out of 12.8 acres of forest is going to be removed by this project. A greater effort to preserve the existing forest should be employed. This could be accomplished by either reducing the number of units and needed infrastructure or clustering the units so that there will be a larger connected area of open space.

- If stormwater management ponds are planned, they should be located on the non-forested portion of the parcel or an alternative method of stormwater management employed.

- According to the DNREC database there is a Black Ash seepage swamp along Alston Branch in which at least 12 rare plants occur. The previous landowner gave permission to our staff to periodically monitor the rare plant community; however, when the land was sold our program was not notified. Our botanist surveyed the area in August of 2005 and found the rare plant community likely destroyed by land clearing activities at this site. DNREC recommends that the current landowner/developer discontinue vegetative clearing activities and leave at least a 100-foot buffer (preferably 300 feet) along Alston branch. The current plan indicates that wetland buffers are only 25 feet in width. This is inadequate for protecting the function and integrity of wetlands. If any rare plants still exist they are within this buffer zone and would be destroyed by a buffer less than 100 feet.

The following are a complete list of comments received by State agencies:

Office of State Planning Coordination – Contact: David Edgell 739-3090

This project is located in Investment Levels 1 and 2 according to the *Strategies for State Policies and Spending.* This site is also located in the Town of Cheswold. Investment Level 1 reflects areas that are already developed in an urban or suburban fashion, where infrastructure is existing or readily available, and where future redevelopment or infill projects are expected and encouraged by State policy. Investment Level 2 reflects areas where growth is anticipated by local, county, and State plans in the near term future. Our office has no objections to the proposed development of this project in accordance with the relevant Town codes and ordinances. We strongly encourage the applicants to address the environmental comments and recommendations found in this letter due to the sensitive natural features present on and adjacent to this site.

Division of Historic and Cultural Affairs – Contact: Alice Guerrant 739-5685

The project will be demolishing all standing structures on the property. Cheswold is the location of recent architectural documentation survey work from students from the University of Delaware through this office. The DHCA requests to be able to gain access the property and complete survey documentation on the property. Should burials be encountered, marked and unmarked human remains, are protected by Delaware law. Please refer to the following sections of the Delaware State Code: (1) Title 11 Sub-Chapter 1340, titled “Desecration of Burial Places”; and (2) Title 7 Chapter 54, known as the “Delaware Unmarked Human Remains Act”. For more information about these laws and the implications for the project, contact Craig Lukesic or Faye Stocum of this office at 302-736-7400. The Division provides a list of qualified consultants on our web site at http://www.state.de.us/shpo/PDF/Consultants.pdf.

Department of Transportation – Contact: Bill Brockenbrough 760-2109

1) Route 42, including Cheswold's Main Street, is classified as a major collector road. Collector road rights-of-way vary in Delaware but are typically wider than those of local roads. DelDOT's policy is to require dedication of sufficient land to provide a minimum right-of-way width of 40 feet from the centerline on collector roads. Therefore they will require right-of-way dedication along the frontage to provide any additional width needed from this project.

2) Because the entrance of the adjoining manufactured housing community, shown on the site plan as lands of Archie D. Blanton, is undesirably close to the railroad tracks, we recommend that a stub street be provided so that the Blanton land can be served through the proposed entrance if it is ever redeveloped. A second stub street to the Blanton land, while less important, would also be desirable in that it would allow for improved circulation between the two developments.

3) DelDOT recommends that the sidewalk, already present along Main Street, be extended into the site and along both sides of the development streets. The DelDOT project manager for Kent County, Mr. Brad Herb, has suggested that, in addition to the sidewalk, a 15-foot wide permanent easement for a future multi-use path should be provided along the site frontage on Main Street. DelDOT asks that the developer's engineer contact Mr. Herb to discuss this matter further. Mr. Herb may be reached at (302) 266-9600.

4) DelDOT recommends that the proposed triangular island be eliminated in favor of a standard tee intersection.

5) The developer's site engineer should contact Mr. Herb regarding DelDOTs specific requirements for access.

The Department of Natural Resources and Environmental Control – Contact: Kevin Coyle 739-9071

Green Infrastructure

Portions or all of the lands associated with this proposal are within the Livable Delaware Green Infrastructure area established under Governor Minner's Executive Order #61 that represents a network of ecologically important natural resource lands of special state conservation interest.

Green infrastructure is defined as Delaware's natural life support system of parks and preserves, woodlands and wildlife areas, wetlands and waterways, productive agricultural and forest land, greenways, cultural, historic and recreational sites and other natural areas all with conservation value. Preserving Delaware's Green Infrastructure network will support and enhance biodiversity and functional ecosystems, protect native plant and animal species, improve air and water quality, prevent flooding, lessen the disruption to natural landscapes, provide opportunities for profitable farming and forestry enterprises, limit invasive species, and foster ecotourism.

Voluntary stewardship by private landowners is essential to green infrastructure conservation in Delaware, since approximately 80 percent of the State's land base is in private hands. It is in that spirit of stewardship that the Department appeals to the landowner and development team to protect sensitive resources through an appropriate site design.

Soils

According to the Kent County soil survey Sassafras, Fallsington, and Johnston were mapped on subject parcel. Sassafras is a well-drained upland soil that, generally, has few limitations for development. Fallsington is a poorly-drained wetland associated (hydric) soil that has severe limitations for development. Johnston is a very poorly-drained wetland associated (hydric) floodplain soil that has the highest severity level for development.

Wetlands

PLUS materials indicate the presence of palustrine forested wetlands along the northern and most of the eastern boundaries of subject parcel. These wetlands provide water quality benefits, attenuate flooding and provide important habitat for plants and wildlife. Vegetated buffers of no less than 100 feet should be employed from the edge of the wetland complex. Site plans clearly show direct impacts to wetlands through construction activities.

This project is located directly adjacent to headwater wetlands associated with the Alston Branch of the greater Leipsic River - greatly increasing the probability of harmful impacts to surface and groundwater quality to all waters within the Leipsic River watershed - making it more difficult for the State to achieve future required TMDL nutrient reductions. It should also be noted that harmful impacts to water quality result in the deterioration in the ecological function of a stream along its entire length, including the floodplain system further downstream. In recognition of the impacts to water and habitat quality and the necessity to protect it for long-term sustainable use, the

Watershed Assessment Section strongly urges the applicant to consider preserving as much of the existing naturally-forested buffer as possible. The buffer should be no less than 100-feet from wetlands and water bodies.

Wetland Permitting Information

PLUS application materials indicate that wetlands have been delineated (presumably a field delineation). This delineation should be verified by the Army Corps of Engineers through the Jurisdictional Determination process. Please note that impacts to palustrine wetlands are regulated by the Army Corps of Engineers through Section 404 of the Clean Water Act. In situations where the applicant believes that the delineated wetlands on their parcel are nonjurisdictional isolated wetlands, the Corps must be contacted to make the final jurisdictional assessment. They can be reached by phone at 736-9763.

In addition, individual 404 permits and certain Nationwide Permits from the Army Corps of Engineers also require 401 Water Quality Certification from the DNREC Wetland and Subaqueous Land Section and Coastal Zone Federal Consistency Certification from the DNREC Division of Soil and Water Conservation, Delaware Coastal Programs Section. Each of these certifications represents a separate permitting process.

To find out more about permitting requirements, the applicant is encouraged to attend a Joint Permit Process Meeting. These meetings are held monthly and are attended by federal and state resource agencies responsible for wetland permitting. Contact Denise Rawding at (302) 739-9943 to schedule a meeting.

Impervious Cover

Based on a review of information submitted as part of the PLUS application, existing pre-development constructed imperviousness is reported as 14.6 percent. This figure appears to be a significant overestimate given the fact that 2002 aerial photography indicates only three building structures on a largely undeveloped 14-acre parcel. Conversely, the projected post-development site imperviousness appears to be an underestimate. The applicant should be made aware that all forms of constructed surface imperviousness (i.e., rooftops, sidewalks and roads) should be included in the impervious surface calculation; otherwise, an inaccurate assessment of this project's actual environmental impacts will be made. It is strongly recommended that the applicant make the appropriate corrections and include these in the finalized project design plans.

Research has consistently shown that once a watershed exceeds a threshold of 10 percent imperviousness, water and habitat quality irreversibly decline. Based on analyses of 2002 aerial photography by the University of Delaware, the Leipsic River watershed, at

that time, had about 5.1 percent impervious cover. Although this data is almost 4 years old and likely an underestimate, it illustrates the importance of a proactive strategy to mitigate for predictable and likely cumulative environmental impacts. Since the amount of imperviousness generated by this project is likely to be significantly above the desirable watershed threshold of 10 percent, the applicant is strongly advised to pursue best management practices (BMPs) that mitigate or reduce some of the most likely adverse impacts. Reducing the amount of surface imperviousness through the use of pervious paving materials ("pervious pavers") in lieu of asphalt or concrete in conjunction with an increase in forest cover via preservation or additional tree plantings – are examples of practical BMPs that could easily be implemented to reduce surface imperviousness.

TMDLs

A Total Maximum Daily Load (TMDL) is the maximum level of pollution for which a water quality limited water body can assimilate without compromising use and recreational goals such as swimming, fishing, drinking water, and shell fish harvesting. Although TMDLs as a "pollution runoff mitigation strategy" to reduce nutrient loading have not yet been developed for the Leipsic River watershed to date, work is continuing on their development and they should be completed by December 2006. Therefore, until the specified TMDL reductions and pollution control strategies are adopted, it shall be incumbent upon the developer to employ best available technologies (BATS) and/or best management practices (BMPs) as "methodological mitigative strategies" to reduce degradative impacts that might be associated with this project. Reducing imperviousness, planting/preservation of trees, maintaining a 100-foot upland buffer width between lot parcel lines and wetlands and streams (where applicable), and the use of "green-technology" stormwater management techniques are some examples of proactive mitigative strategies that will help reduce excessive nutrient runoff from this development and it impacts on water quality, while ensuring State compliance with imminent Federal TMDL regulatory requirements.

Water Supply

The information provided indicates that Tidewater Utilities will provide water to the proposed projects through a central public water system. DNREC files reflect that Tidewater Utilities does not currently hold a certificate of public convenience and necessity (CPCN) to provide public water in these areas. They will need to file an application for a CPCN with the Public Service Commission, if they have not done so already. Information on CPCN requirements and applications can be obtained by contacting the Public Service Commission at 302-739-4247. Should an on-site public well be needed, it must be located at least 150 feet from the outermost boundaries of the

project. The Division of Water Resources will consider applications for the construction of on-site wells provided the wells can be constructed and located in compliance with all requirements of the Regulations Governing the Construction and Use of Wells. A well construction permit must be obtained prior to constructing any wells.

Should dewatering points be needed during any phase of construction, a dewatering well construction permit must be obtained from the Water Supply Section prior to construction of the well points. In addition, a water allocation permit will be needed if the pumping rate will exceed 50,000 gallons per day at any time during operation.

All well permit applications must be prepared and signed by licensed water well contractors, and only licensed well drillers may construct the wells. Please factor in the necessary time for processing the well permit applications into the construction schedule. Dewatering well permit applications typically take approximately four weeks to process, which allows the necessary time for technical review and advertising.

Should you have any questions concerning these comments, please contact Rick Rios at 302-739-9944.

Sediment and Erosion Control/Stormwater Management

A detailed sediment and stormwater plan will be required prior to any land disturbing activity taking place on the site. The plan review and approval as well as construction inspection will be coordinated through Kent Conservation District. Contact Jared Adkins, Program Manager, at (302) 741-2600, ext. 3, for details regarding submittal requirements and fees.

A Notice of Intent (NOI) for Stormwater Discharges Associated with Construction Activity must be submitted to DNREC Division of Soil and Water Conservation along with the $195 NOI fee prior to plan approval.

Applying practices to mimic the pre-development hydrology on the site, promote recharge, maximize the use of existing natural features on the site, and limit the reliance on structural stormwater components, such as maintaining open spaces, should be considered in the overall design of the project as a stormwater management technique. Green Technology BMPs must be given first consideration for stormwater quality management. Each stormwater management facility should have an adequate outlet for release of stormwater.

It is strongly recommended that you contact the reviewing agency to schedule a preliminary meeting to discuss the sediment and erosion control and stormwater management components of the plan. The site topography, soils mapping, pre- and post-development runoff, and proposed method(s) and location(s) of stormwater management should be brought to the meeting for discussion.

Drainage

The Drainage Program requests the wetland buffers on this project be open space. Relocate townhouses that adjoin wetlands to avoid the wetland buffer from being the backyards. During prolonged wet periods, the wetland buffer may become too wet for normal residential use. Designation as open space will aid in the prevention of decks, sheds, fences, and kennels placed within the buffer thereby reducing nuisance drainage complaints.

The Drainage Program requests the engineer take precautions to ensure the project does not hinder any off site drainage upstream of the project or create any off site drainage problems downstream by the release of on site storm water. The Drainage Program requests the engineer check existing downstream ditches and pipes for function and blockages prior to construction. Please notify downstream landowners if there will be a change in the volume of water released on them.

The Drainage Program encourages the elevation of rear yards to direct water towards the streets where storm drains are accessible for maintenance. The Drainage Program recognizes the need for catch basins in rear yards in certain cases. Catch basins placed in rear yards will need to be clear of obstructions and be accessible for maintenance. Decks, sheds, fences, and kennels should not be placed along the storm drain or near the catch basin. Deed restrictions or easements recorded on the deed, should be placed on the property to ensure maintenance access.

Preserve existing riparian buffers to aid in the reduction of nutrients, sediment, and other pollutants. For the further enhancement of water quality in the Alston Branch, the Drainage Program encourages additional widths of vegetated buffers and other water quality measures on this project.

Floodplains

Kent County does not permit the subdivision of land in the 100-year floodplain. As long as no development is proposed in the floodplain, then no additional flood studies or design restrictions would apply. If any land development or construction activities are

proposed in the 100-year floodplain, then a detailed flood study would be required to determine 100-year flood elevations and the floodplain accordingly revised.

Forest Preservation

According to the application, 9.4 acres out of 12.8 acres of forest is going to be removed by this project. A greater effort to preserve the existing forest should be employed. This could be accomplished by either reducing the number of units and needed infrastructure or clustering the units so that there will be a larger connected area of open space. In addition, if stormwater management ponds are planned, they should be located on the non-forested portion of the parcel or an alternative method of stormwater management employed.

Rare Species

According to our database there is a Black Ash seepage swamp along Alston Branch in which at least 12 rare plants occur. The previous landowner gave permission to our staff to periodically monitor the rare plant community; however, when the land was sold our program was not notified. Our botanist surveyed the area in August of 2005 and found the rare plant community likely destroyed by land clearing activities at this site. We recommend that the current landowner/developer discontinue vegetative clearing activities and leave at least a 100-foot buffer (preferably 300 feet) along Alston branch. The current plan indicates that wetland buffers are only 25 feet in width. This is inadequate for protecting the function and integrity of wetlands. If any rare plants still exist they are within this buffer zone and would be destroyed by a buffer less than 100 feet. There should not be lot lines or infrastructure within this buffer zone and it should be placed in permanent conservation so that future clearing is less likely to occur.

Wetland buffers reduce the amount of sediments, pollutants, and other non-point source material that may affect the function and integrity of habitat and the condition and survivability of aquatic organisms. Forested buffers also serve as habitat for many terrestrial species that are dependent on aquatic and wetlands habitats for a portion of their annual life cycle.

Nuisance Waterfowl

It is unclear how many stormwater management ponds are planned, but ponds can attract waterfowl like resident Canada geese and mute swans. High concentrations of waterfowl in ponds create water-quality problems, leave droppings on lawn and paved areas and can become aggressive during the nesting season. Short manicured lawns around ponds provide an attractive habitat for these species. We recommend native plantings of tall

grasses, wildflowers, shrubs, and trees at the edge and within a buffer area (50 feet) around the perimeter. Waterfowl do not feel safe when they can not see the surrounding area for possible predators. These plantings should be completed as soon as possible as it is easier to deter geese when there are only a few than it is to remove them once they become plentiful. The Division of Fish and Wildlife does not provide goose control services, and if problems arise, residents or the home-owners association will have to accept the burden of dealing with these species (e.g., permit applications, costs, securing services of certified wildlife professionals, etc.). Solutions can be costly and labor intensive; however, with proper landscaping, monitoring, and other techniques, geese problems can be minimized.

Solid Waste

Each Delaware household generates approximately 3,600 pounds of solid waste per year. On average, each new house constructed generates an additional 10,000 pounds of construction waste. Due to Delaware's present rate of growth and the impact that growth will have on the state's existing landfill capacity, the applicant is requested to be aware of the impact this project will have on the State’s limited landfill resources and, to the extent possible, take steps to minimize the amount of construction waste associated with this development.

Underground Storage Tanks

There are two inactive LUST site(s) located near the proposed project:

Roy's Electric, Facility # 1-000231, Project # K9510233
DEL-DOT Cheswold, Facility # 1-000305, Project # K 9907148

No environmental impact is expected from the above inactive/active LUST site(s). However, should any underground storage tank or petroleum contaminated soil be discovered during construction, the Tank Management Branch must be notified as soon as possible. It is not anticipated that any construction specifications would be need to be changed due to petroleum contamination. However, should any unanticipated contamination be encountered and PVC pipe is being utilized, it will need to be changed to ductile steel with nitrile rubber gaskets in the contaminated areas.

Air Quality

Once complete, vehicle emissions associated with this project are estimated to be 6.6 tons (13,200.1 pounds) per year of VOC (volatile organic compounds), 5.5 tons (10,928.8 pounds) per year of NOx (nitrogen oxides), 4.0 tons (8,063.5 pounds) per year of SO2

(sulfur dioxide), 0.4 ton (717.8 pounds) per year of fine particulates and 552.1 tons (1,104,171.8 pounds) per year of CO2 (carbon dioxide).

Emissions from area sources associated with this project are estimated to be 2.7 tons (5,324.2 pounds) per year of VOC (volatile organic compounds), 0.3 ton (585.8 pounds) per year of NOx (nitrogen oxides), 0.2 ton (486.2 pounds) per year of SO2 (sulfur dioxide), 0.3 ton (627.4 pounds) per year of fine particulates and 10.8 tons (21,583.1 pounds) per year of CO2 (carbon dioxide).

Emissions from electrical power generation associated with this project are estimated to be 1.1 tons (2,110.1 pounds) per year of NOx (nitrogen oxides), 3.7 tons (7,339.6 pounds) per year of SO2 (sulfur dioxide) and 541.3 tons (1,082,588.6 pounds) per year of CO2 (carbon dioxide).

	VOC	NOx	SO_2	$PM_{2.5}$	CO_2
Mobile	6.6	5.5	4.0	0.4	552.1
Residential	2.7	0.3	0.2	0.3	10.8
Electrical Power		1.1	3.7		541.3
TOTAL	9.3	6.9	7.9	0.7	1104.2

For this project the electrical usage via electric power plant generation alone totaled to produce an additional 1.1 tons of nitrogen oxides per year and 3.7 tons of sulfur dioxide per year.

A significant method to mitigate this impact would be to require the builder to construct Energy Star qualified homes. Every percentage of increased energy efficiency translates into a percent reduction in pollution. Quoting from their webpage, http://www.energystar.gov/:
"ENERGY STAR qualified homes are independently verified to be at least 30% more energy efficient than homes built to the 1993 national Model Energy Code or 15% more efficient than state energy code, whichever is more rigorous. These savings are based on heating, cooling, and hot water energy use and are typically achieved through a combination of:

building envelope upgrades,
high performance windows,
controlled air infiltration,
upgraded heating and air conditioning systems,
tight duct systems and

upgraded water-heating equipment."

The DNREC Energy office is in the process of training builders in making their structures more energy efficient. The Energy Star Program is excellent way to save on energy costs and reduce air pollution. They highly recommend this project development and other residential proposals increase the energy efficiency of their homes.

They also recommend that the home builders offer geothermal and photo voltaic energy options. Applicable vehicles should use retrofitted diesel engines during construction. The development should provide tie-ins to the nearest bike paths, links to mass transit, and fund a lawnmower exchange program for their new occupants.

State Fire Marshal's Office – Contact: John Rossiter 739-4394

These comments are intended for informational use only and do not constitute any type of approval from the Delaware State Fire Marshal's Office. At the time of formal submittal, the applicant shall provide; completed application, fee, and three sets of plans depicting the following in accordance with the Delaware State Fire Prevention Regulation (DSFPR):

a. **Fire Protection Water Requirements**:
- Water distribution system capable of delivering at least 1000 gpm for 1-hour duration, at 20-psi residual pressure is required. Fire hydrants with 800 feet spacing on centers.
- Where a water distribution system is proposed for townhouse type dwelling sites, the infrastructure for fire protection water shall be provided, including the size of water mains.

b. **Fire Protection Features:**
- For townhouse buildings, provide a section / detail and the UL design number of the 2-hour fire rated separation wall on the Site plan

c. **Accessibility:**
- All premises which the fire department may be called upon to protect in case of fire, and which are not readily accessible from public roads, shall be provided with suitable gates and access roads, and fire lanes so that all buildings on the premises are accessible to fire apparatus. This means that the access road to the subdivision from Main Street must be constructed so fire department apparatus may negotiate it.
- Fire department access shall be provided in such a manner so that fire apparatus will be able to locate within 100 ft. of the front door.

- Any dead end road more than 300 feet in length shall be provided with a turn-around or cul-de-sac arranged such that fire apparatus will be able to turn around by making not more than one backing maneuver. The minimum paved radius of the cul-de-sac shall be 38 feet. The dimensions of the cul-de-sac or turn-around shall be shown on the final plans. Also, please be advised that parking is prohibited in the cul-de-sac or turn around.
- The use of speed bumps or other methods of traffic speed reduction must be in accordance with Department of Transportation requirements.
- The local Fire Chief, prior to any submission to our Agency, shall approve in writing the use of gates that limit fire department access into and out of the development or property.

d. **Gas Piping and System Information:**
- Provide type of fuel proposed, and show locations of bulk containers on plan.

e. **Required Notes**:
- Provide a note on the final plans submitted for review to read " All fire lanes, fire hydrants, and fire department connections shall be marked in accordance with the Delaware State Fire Prevention Regulations"
- Proposed Use
- Square footage of each structure (Total of all Floors)
- National Fire Protection Association (NFPA) Construction Type
- Maximum Height of Buildings (including number of stories)
- Name of Water Provider
- Letter from Water Provider approving the system layout
- Townhouse 2-hr separation wall details shall be shown on site plans
- Provide Road Names, even for County Roads

Preliminary meetings with fire protection specialists are encouraged prior to formal submittal. Please call for appointment. Applications and brochures can be downloaded from our website: www.delawarestatefiremarshal.com, technical services link, plan review, applications or brochures.

Department of Agriculture - Contact: Milton Melendez 698-4500

The Delaware Department of Agriculture has no objections to the Diakos application. The site is located on a controlled development area. The *Strategies for State Policies and Spending* encourages environmentally responsible development in areas within a Growth Level 2 Zone. This site is a part of a "good recharge" area. DNREC has mapped

all ground water potential recharge areas. A "good recharge" rating is the highest rating and designates an area as having important groundwater recharge qualities. Maintaining pervious cover in "Excellent" and "Good" recharge areas is crucial for the overall environmental health of our state and extremely important to efforts which ensure a safe drinking water supply for future generations. Retention of pervious cover to ensure an adequate future water supply is also important for the future viability of agriculture in the First State. The loss of every acre of land designated as "excellent" and "good" recharge areas adversely impacts the future prospects for agriculture in Delaware.

Right Tree for the Right Place

The Delaware Department of Agriculture Forest Service encourages the developer to use the "Right Tree for the Right Place" for any design considerations. This concept allows for the proper placement of trees to increase property values in upwards of 25% of appraised value and will reduce heating and cooling costs on average by 20 to 35 dollars per month. In addition, a landscape design that encompasses this approach will avoid future maintenance cost to the property owner and ensure a lasting forest resource.

Native Landscapes

The Delaware Department of Agriculture and the Delaware Forest Service encourages the developer to use native trees and shrubs to buffer the property from the adjacent land-use activities near this site. A properly designed forested buffer can create wildlife habitat corridors and improve air quality to the area by removing six to eight tons of carbon dioxide annually and will clean our rivers and creeks of storm-water run-off pollutants. To learn more about acceptable native trees and how to avoid plants considered invasive to our local landscapes, please contact the Delaware Department of Agriculture Plant Industry Section at (302) 698-4500.

Tree Mitigation

The Delaware Forest Service encourages the developer to implement a tree mitigation program to replace trees at a 1:1 ratio within the site and throughout the community. This will help to meet the community's forestry goals and objectives and reduce the environmental impacts to the surrounding natural resources. To learn more, please contact our offices at (302) 349-5754.

Public Service Commission - Contact: Andrea Maucher 739-4247

Any expansion of natural gas or installation of a closed propane system must fall within Pipeline Safety guidelines. Contact: Malak Michael at (302) 739-4247.

Delaware State Housing Authority – Contact Jimmy Atkins 739-4263

This proposal is to develop 86 townhomes on 14 acres located on the north side of Main Street in Cheswold. According to the State Strategies Map, the proposal is located in an Investment Level 1 area. DSHA supports this proposal because residents will have proximity to services, markets, and employment opportunities. The proposal also targets first time homebuyers. For informational purposes, the most recent real estate data collected by DSHA, the median home price in Kent County is $233,973. However, families earning 80% of Kent County's median income only qualify for mortgages of $147,099. It is recommended that some of the units be set-aside at this price level to ensure that working households have access to affordable housing.

Following receipt of this letter and upon filing of an application with the local jurisdiction, the applicant shall provide to the local jurisdiction and the Office of State Planning Coordination a written response to comments received as a result of the pre-application process, noting whether comments were incorporated into the project design or not and the reason therefore.

Thank you for the opportunity to review this project. If you have any questions, please contact me at 302-739-3090.

Sincerely,

Constance C. Holland, AICP
Director

CC: Kent County